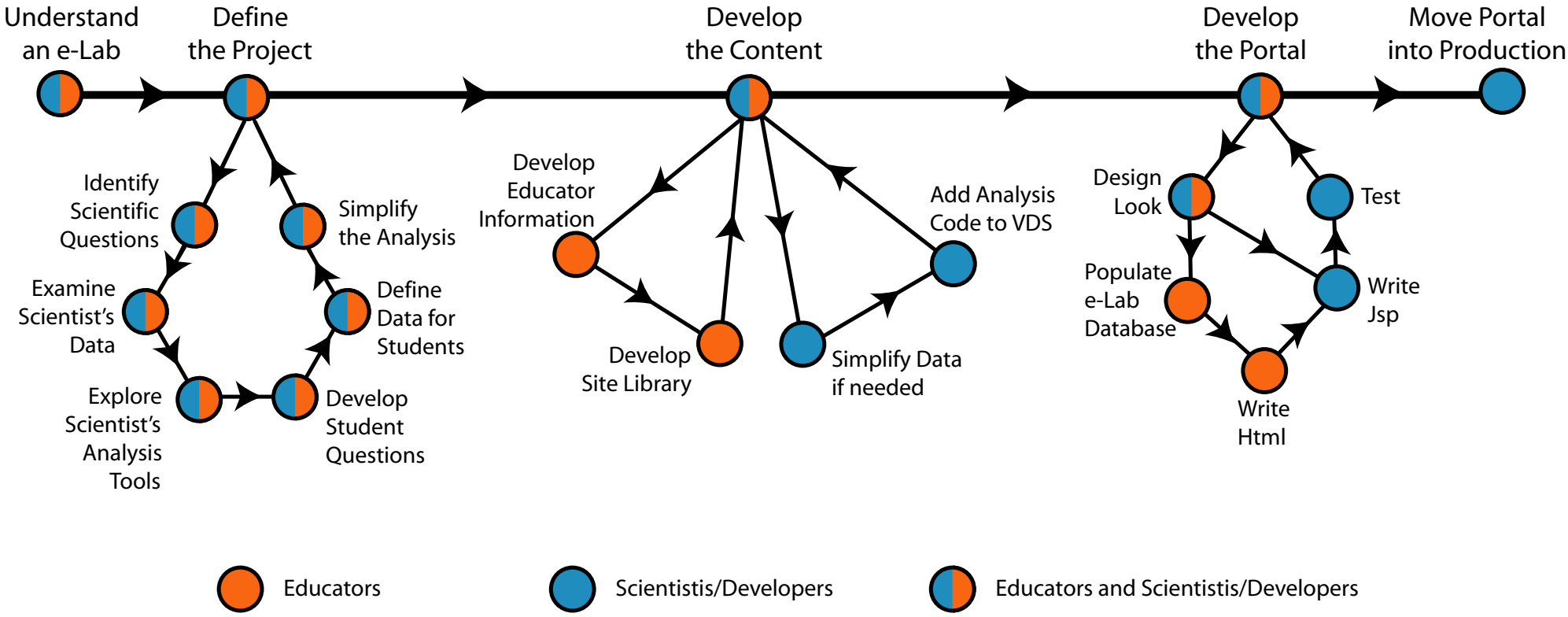
Workflow for Making an e-Lab



Understand an e-Lab

Scientist/Techie View
Architecture and Implementation:
Served from a centralized server

- Common e-Lab database and tools
- Virtual Data System and Chiron
- Java Server Pages / Java Beans

Student / Educator View

- Project Page
- Educator Side
- Student Side
  - Data and Analysis
  - Library
  - Logbook
  - Posters
  - Assessment

Common Elements

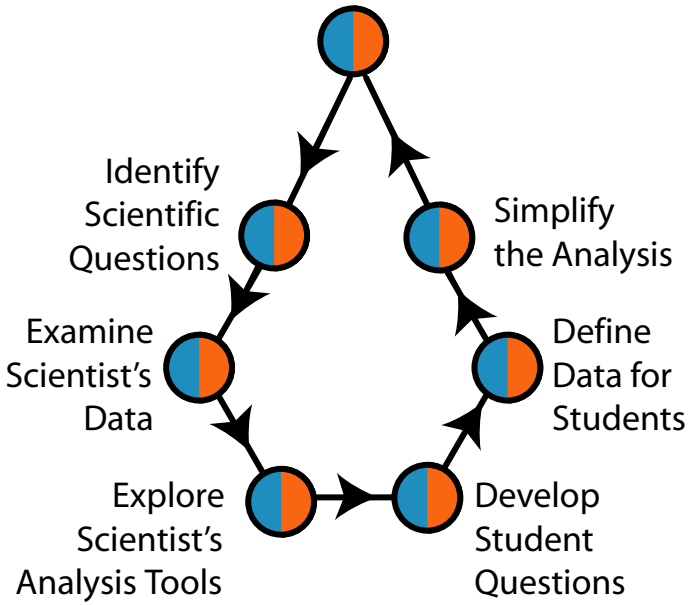
User Registration
Library: Study Guide (Milestones), References,Glossary Items
Logbook, Comments
Workflows, Execution, Search, Plots, Annotations

 Educators

 Scientistis/Developers

 Educators and Scientistis/Developers

Define the Project



Scientists and educators meet together to understand how to translate the scientist's research tools and data into a student-centered research experience.
They identify
- what kind of research questions students can answer.
- how to make the data accessible to students.
- narrow down the analyses students can do.
- limit the input parameters; visualize an interface.

Educators
- experiment with tools and data with students
- optionally work with data with local tools (Excel)

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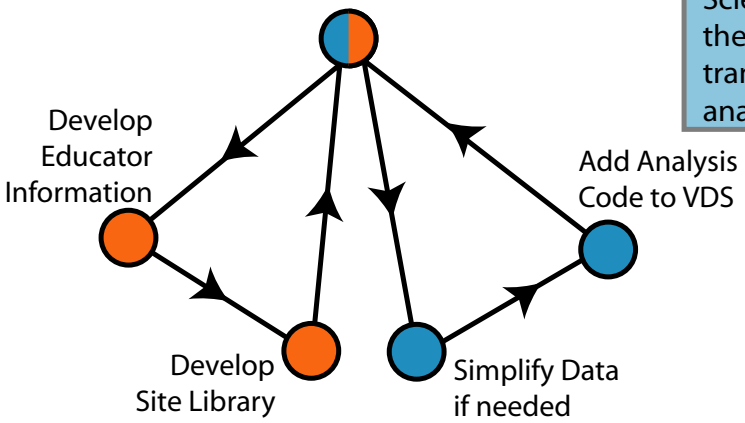
Develop the Content

Educators develop content for the teacher portal:
- Home
- Rubric
- Standards
- Classroom Notes



Scientists/developers add the analysis code to the Virtual Data System. They define and test the transformations and derivations for the analyses students will do in the portal.

Educators develop content for the Library:
- Study Guide (milestones and references)
- Resources (Online resources, glossary, tutorials)

Scientists/developers filter data to include important features for student research.

Educators

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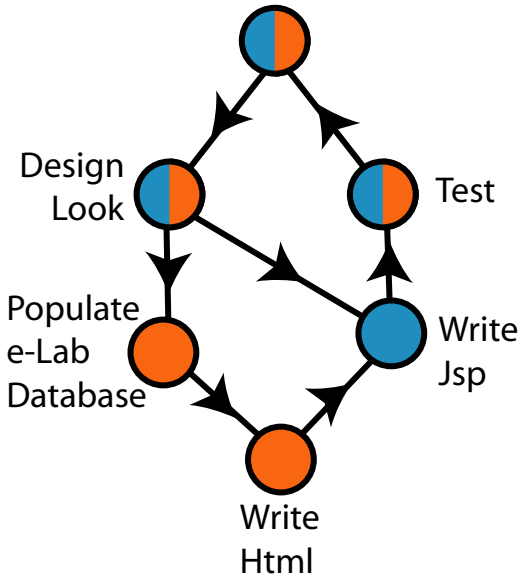
Develop the Portal

Determine the common look for e-Lab (graphics, navigation buttons)



Test portal over and over!

Add to the e-Lab Database
- Milestones
- References
- Glossary Items

Write jsp pages including data analysis pages using java beans provided in the e-Lab toolkit.

Tailor include files to use e-Lab specific graphics.

Convert teachers pages to jsp pages.

Take content for educators and put into templates for educator portal.
- Home
- Rubric
- Classroom Notes, etc.

Educators

Scientistis/Developers

Educators and Scientistis/Developers